

## ABSTRACT OF THE DISCLOSURE

A force-applying input device includes a controller including a first rotational angular speed calculating unit  
5 for calculating rotational angular speed information of an operation unit by signal pulse output from an encoder, a rotational angular acceleration calculating unit for calculating rotational angular acceleration information of the operation unit by torque information output from a torque  
10 calculating unit, a second rotational angular speed calculating unit for calculating rotational angular speed information of the operation unit by the information output from the rotational angular acceleration calculating unit, and a rotational angular speed selecting unit for selecting  
15 the information output from the first rotational angular speed calculating unit or that output from the second rotational angular speed calculating unit, the latter being selected when the information output from the first rotational angular speed calculating unit exceeds a  
20 predetermined value, and outputted to the torque calculating unit and a rotational angle calculating unit.